California Environmental Protection Agency Air Resources Board

DEUTZ AG

EXECUTIVE ORDER U-R-013-0523 New Off-Road Compression-Ignition Engines

Pursuant to the authority vested in the Air Resources Board by Sections 43013, 43018, 43101, 43102, 43104 and 43105 of the Health and Safety Code; and

Pursuant to the authority vested in the undersigned by Sections 39515 and 39516 of the Health and Safety Code and Executive Order G-14-012;

IT IS ORDERED AND RESOLVED: That the following compression-ignition engines and emission control systems produced by the manufacturer are certified as described below for use in off-road equipment. Production engines shall be in all material respects the same as those for which certification is granted.

MODEL YEAR	ENGINE FAMILY	DISPLACEMENT (liters)	FUEL TYPE	USEFUL LIFE (hours)		
2016	GDZXL05.7053	5.702	Diesel			
	FEATURES & EMISSION		TYPICAL EQUIPMENT APPLICATION			
Cooler	Rail Direct Injection, Turb , Electronic Control Mod ation, Diesel Oxidation C xidizer, Selective Catalyt	lule, Exhaust Gas	Loader, Compressor, Pump, Generator Set, Other Industrial Equipment			

The engine models and codes are attached.

The following are the exhaust certification standards (STD) and certification levels (CERT) for non-methane hydrocarbon (NMHC), oxides of nitrogen (NOx), or non-methane hydrocarbon plus oxides of nitrogen (NMHC+NOx), carbon monoxide (CO), and particulate matter (PM) in grams per kilowatt-hour (g/kW-hr), and the opacity-of-smoke certification standards and certification levels in percent (%) during acceleration (Accel), lugging (Lug), and the peak value from either mode (Peak) for this engine family (Title 13, California Code of Regulations, (13 CCR) Section 2423):

RATED	EMISSION		EXHAUST (g/kW-hr)					OPACITY (%)		
POWER	STANDARD		NMHC	NOx	NMHC+NOx	СО	PM	ACCEL	LUG	PEAK
75 ≤ kW < 130	Tier 4 Final	STD	0.19	0.40	N/A	5.0	0.02	N/A	N/A	N/A
		CERT	0.03	0.30		0.1	0.01			

BE IT FURTHER RESOLVED: That for the listed engine models, the manufacturer has submitted the information and materials to demonstrate certification compliance with 13 CCR Section 2424 (emission control labels), and 13 CCR Sections 2425 and 2426 (emission control system warranty).

Engines certified under this Executive Order must conform to all applicable California emission regulations.

This Executive Order is only granted to the engine family and model-year listed above. Engines in this family that are produced for any other model-year are not covered by this Executive Order.

Executed at El Monte, California on this ______ day of March 2016.

Annette Hebert, Chief

Emissions Compliance, Automotive Regulations and Science Division

Deutz AG Nonroad CI

Engine Model Summary Template

Attachment page 1 of 1

EO# U-R-013-0523 Date: 1/27/2016

Engine Family	1.Engine Code	2.Engine Model	3.BHP@RPM (SAE Gross)	4.Fuel Rate: mm/stroke @ peak HP (for diesel only)	(lbs/hr) @ peal HP (for diesels only)	6.Torque @ RPM (SEA Gross)	7.Fuel Rate: mm/stroke@pe ak torque	8.Fuel Rate: (lbs/hr)@peak torque	9.Emission Control Device Per SAE J1930
GDZXL05.7053	CFVI129A	D6J	172.9@1800	101	60.5	850@1350	123	55.3	DDI,TC,CAC,ECM,EGR,DOC,CTOX,SCR
GDZXL05.7053	CFVI129B	D6J	172.9@1800	101	60.5	850@1350	123	55.3	DDI,TC,CAC,ECM,EGR,DOC,CTOX,SCR
GDZXL05.7053	CFVI129C	D6J	172.9@2000	96	63.9	850@1350	123	55.3	DDI,TC,CAC,ECM,EGR,DOC,CTOX,SCR
GDZXL05.7053	CFVI115A	D6J	154.2@1900	99	55	716@1400	102.5	47.8	DDI,TC,CAC,ECM,EGR,DOC,CTOX,SCR
GDZXL05.7053	CFVI129E	D6J	172.9@2000	96	63.9	850@1350	123	55.3	DDI,TC,CAC,ECM,EGR,DOC,CTOX,SCR
GDZXL05.7053	CFVI129F	D6J	172.9@2000	96	63.9	850@1350	123	55.3	DDI,TC,CAC,ECM,EGR,DOC,CTOX,SCR
GDZXL05.7053	CFVI129G	D6J	172.9@2000	96	63.9	850@1350	123	55.3	DDI,TC,CAC,ECM,EGR,DOC,CTOX,SCR
GDZXL05.7053	CFVI129H	D6J	172.9@2000	96	63.9	850@1350	123	55.3	DDI,TC,CAC,ECM,EGR,DOC,CTOX,SCR
GDZXL05.7053	CFVI98	D6J	131.4@2200	71.5	52.4	820@1400	117.5	54.8	DDI,TC,CAC,ECM,EGR,DOC,CTOX,SCR
GDZXL05.7053	CFVI115	D6J	154.2@2200	81.5	59.7	850@1400	120.5	56.2	DDI,TC,CAC,ECM,EGR,DOC,CTOX,SCR
GDZXL05.7053	CFVI115S	SD60F	154.2@2200	81.5	59.7	850@1400	120.5	56.2	DDI,TC,CAC,ECM,EGR,DOC,CTOX,SCR
GDZXL05.7053	CFVI98S	SD60F	131.4@2200	71.5	52.4	820@1400	117.5	54.8	DDI,TC,CAC,ECM,EGR,DOC,CTOX,SCR